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| APPLICATION NO.   | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO.                | CONFIRMATION NO. |
|---|-------------|----------------------|------------------------------------|------------------|
| 10/044,422  | 01/11/2002  | Teruhiko Kori        | 7217/66290                         | 1067             |
| 530 7590 02/27/2007<br>LERNER, DAVID, LITTENBERG,<br>KRUMHOLZ & MENTLIK<br>600 SOUTH AVENUE WEST<br>WESTFIELD, NJ 07090 |             |                      | EXAMINER<br>CERVETTI, DAVID GARCIA |                  |
|   |             |                      | ART UNIT<br>2136                   | PAPER NUMBER     |
| SHORTENED STATUTORY PERIOD OF RESPONSE  |             | MAIL DATE            | DELIVERY MODE                      |                  |
| 3 MONTHS  |             | 02/27/2007           | PAPER                              |                  |

**Please find below and/or attached an Office communication concerning this application or proceeding.**

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

**Office Action Summary**

Application No.

10/044,422

Applicant(s)

KORI, TERUHIKO

Examiner

David G. Cervetti

Art Unit

2136

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 27 November 2006.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1,2,4-7,10 and 11 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1,2,4-7,10 and 11 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 11 January 2002 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

### DETAILED ACTION

1. Applicant's arguments filed November 27, 2006, have been fully considered but they are not persuasive.
2. Claims 1-2, 4-7, and 10-11 are pending and have been examined, claims 3, 8-9, and 12-17 have been cancelled.

### *Response to Amendment*

3. Contrary to Applicant's interpretation of Sullivan et al. (US Patent Number 6,069,647, hereinafter "Sullivan"), Examiner respectfully submits that Sullivan not only teaches "digital content that is decrypted and re-encrypted with a key that is recognized by a programmable unit" (col. 5, lines 35-39) as correctly pointed out by Applicant, but also that the digital content is encrypted by a key (TSK) that is stored in the interface unit (numeral 130, fig. 1) and provided in the digital content (col. 5, lines 25-35) (this is how the content is decrypted at the programmable unit) and then uses a key stored at the programmable unit to re-encrypt the content (col. 5, lines 35-40). Sullivan further teaches public key infrastructure to provide means for authentication of parties to a communication session, i.e. producing signatures of a key of the programmable unit (col. 8, lines 5-60). **Applicant's arguments are not persuasive.**
4. Assuming arguendo Sullivan does not intend to teach that the programmable memory may decrypt with the key received in the digital content and re-encrypt with a key stored in said programmable memory, such a modification would have been obvious to someone of ordinary skill in the art, as clearly taught by Colvin, Sr (US Patent 6,041,123) "A system of secure communications between multiple parties. This system uses an

Art Unit: 2136

index/secure key combination for each party. The index key never changes its value. A secured central router with access to a master database uses index keys to look up corresponding secure keys in the master database. The central router uses the secure keys to decrypt messages sent by parties and reencrypt the messages for the recipients and, thus, acts as a conduit for secure communications between parties.” (abstract) and Heer et al. (US Patent 5,999,629) “Assuming that ACS 40 finds that the message is valid, then it uses the symmetrical key that it generated and shares with module 30, to decrypt the encrypted program encryption key contained in the message and then reencrypts the key using its own device unique key S.sub.local. Module 30 then stores the result along with the associated serial number and program identity as an entry in database 27 (FIG. 2).” (col. 5, lines 5-30) and Hamilto et al. (US Patent 5,504,816) “a method and apparatus are provided for controlling access to digital signals sent via a first communication path and retransmitted over a second communication path. The digital signals, having been encrypted by a first encryption scheme and sent over the first communication path, are received and decrypted. The decrypted signals are then retransmitted over the second communication path using a second encryption scheme that differs from the first encryption scheme.” (abstract).

**Applicant's arguments are not persuasive.**

### ***Claim Objections***

5. Claims 1 and 7 are objected to because of the following informalities: “an process”. Appropriate correction is required.

### ***Claim Rejections - 35 USC § 102***

6. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

7. Claims 1-2, 4-7, and 10-11 are rejected under 35 U.S.C. 102(a) as being anticipated by Sullivan.

Regarding claim 1, Sullivan teaches an electronic transmission apparatus , comprising:

- first and second communication means connected to a signal transmission line, the signal transmission line connecting a transmitting electronic device to said first communication means and connecting a receiving electronic device to said second communication means, said first communication means receiving an encrypted signal from the transmitting electronic device over the signal transmission line **(col. 8, lines 5-60)**;
- authentication process means for executing a first authentication process with the transmitting electronic device via said first communication means and the signal transmission line, said first communication means receiving first key information from the transmitting electronic device over the signal transmission line based on a result of the first authentication process **(col. 9, lines 12-43)**;
- decryption means for decrypting the encrypted signal using the first key information, said authentication process means supplying the first key information to said decryption means based on the result of the first authentication process **(col. 5, lines 1-55)**;
- processing means for executing a process with the decrypted signal provided by said decryption means, said processing means including a section operable to display or record the decrypted signal **(col. 4, lines 47-65, col. 5, lines 55-67)**;

- said second communication means enabling execution of a second authentication process with the receiving electronic device over the signal transmission line (**col. 5, lines 55-67, col. 6, lines 55-67**);
- encryption means for re-encrypting the decrypted signal using second key information, said authentication process means supplying the second key information to said encryption means (**col. 5, lines 27-55**); and
- signal switching means for selecting, for output to said second communication means, one of the encrypted signal and the re-encrypted signal in response to a result of the second authentication process, said first communication means supplying the encrypted signal to said signal switching means, said encryption means supplying the re-encrypted signal to said switching means (**col. 9, lines 1-43**);
- said authentication process means supplying the first key information to said second communication means when said signal switching means selects the encrypted signal and supplying the second key information to said second communication means when said signal switching means selects the re-encrypted signal (**col. 5, lines 27-67**);
- said second communication means transmitting the first or second key information and the selected one of the encrypted signal and the re-encrypted signal over the signal transmission line to the receiving electronic device (**col. 5, lines 55-67**).

**Regarding claim 7**, Sullivan teaches a signal transmission method comprising:

- executing a first authentication process with a transmitting electronic device over a signal transmission line (**col. 9, lines 12-43**);
- receiving an encrypted signal from the transmitting electronic device over the signal transmission line (**col. 8, lines 5-60**);
- receiving first key information from the transmitting electronic device over the signal transmission line based on a result of said first authentication process (**col. 5, lines 27-67**);
- decrypting the encrypted signal using the first key information (**col. 5, lines 27-67**);
- executing a process using the decrypted signal, the process including displaying or recording the decrypted signal (**col. 5, lines 55-67**);
- executing a second authentication process with a receiving electronic device over the signal transmission line (**col. 5, lines 55-67, col. 6, lines 55-67**);
- re-encrypting the decrypted signal using second key information (**col. 5, lines 27-67**);
- selecting, for transmission to the receiving electronic device, one of the encrypted signal and the re-encrypted signal in response to a result of the second authentication process (**col. 9, lines 1-43**);
- transmitting the selected one of the encrypted signal and the re-encrypted signal over the signal transmission line to the receiving electronic device (**col. 5, lines 27-67**); and

- transmitting the first key information to the receiving electronic device via the signal transmission line when the encrypted signal is selected, and transmitting the second key information to the receiving electronic device via the signal transmission line when the re-encrypted signal is selected (**col. 5, lines 55-67**).

**Regarding claim 2, Sullivan teaches**

- wherein said authentication process means supplies the first or second key information to the receiving electronic device based on the result of the second authentication process (**col. 5, lines 55-67**).

**Regarding claim 4, Sullivan teaches**

- wherein said authentication process means executes the second authentication process with the receiving electronic device via said second communication means and the signal transmission line, and supplies the first or second key information for decrypting the selected one of the encrypted signal and the re-encrypted signal selected by said signal switching means to the receiving electronic device via said second communication means and the signal transmission line based on the result of the second authentication process (**col. 5, lines 25-67**).

**Regarding claim 5, Sullivan teaches**

- wherein the selecting operation carried out by said signal switching means is based on a selection signal supplied by the transmitting electronic device



through via said first communication means and the signal transmission line  
(col. 5, lines 55-67).

**Regarding claim 6**, Sullivan teaches

- operation input means for controlling the switching operation of said signal switching means (col. 5, lines 55-67).

**Regarding claim 10**, Sullivan teaches

- wherein said step of selecting one of the encrypted signal or the re-encrypted signal is executed based on a signal received from the transmitting electronic device (col. 5, lines 1-55).

**Regarding claim 11**, Sullivan teaches

- wherein said step of selecting one of the encrypted signal or the re-encrypted signal is executed based on an operation result of an operation input means (col. 5, lines 55-67).

### ***Conclusion***

8. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the

Art Unit: 2136

shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

9. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. US Patent 6,061,451 to Muratani et al., US Patent 6,128,605 to Saito et al., US Patent 6,252,964 to Wasilewski et al., US Patent 6,834,110 to Marconcini et al., US Patent 6,188,397 to Humpleman.

10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to David G. Cervetti whose telephone number is (571) 272-5861. The examiner can normally be reached on Monday-Friday 7:00 am - 5:00 pm, off on Wednesday.

11. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Nasser G. Moazzami can be reached on (571) 272-4195. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.


12. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic

Art Unit: 2136

Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

DGC

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